# RAW SEQUENCE LISTING

**The Biotechnology Systems Branch of the Scientific and Technical Information Center (STIC) no errors detected.**

Application Serial Number: 10 519,811

Source: PCT

Date Processed by STIC: 1-12-05

# *ENTERED*

PCT

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  5 <110> APPLICANT: University of Guelph
  7 <120> TITLE OF INVENTION: Novel Inducible Genes From Alfalfa And Method Of Use Thereof
  9 <130> FILE REFERENCE: 08-892370WO
C--> 11 <140> CURRENT APPLICATION NUMBER: US/10/519,811
C--> 12 <141> CURRENT FILING DATE: 2004-12-28
 14 <150> PRIOR APPLICATION NUMBER: 60/392,444
 15 <151> PRIOR FILING DATE: 2002-06-28
 17 <160> NUMBER OF SEQ ID NOS: 19
 19 <170> SOFTWARE: PatentIn version 3.1
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 22 <211> LENGTH: 474
 23 <212> TYPE: DNA
 24 <213> ORGANISM: Medicago sativa
 26 <220> FEATURE:
 27 <223> OTHER INFORMATION: Nucleotide sequence of H7 coding region
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 34 gttgaaattg ttgaaggaaa tggaggaccc ggaactatta agaagctatc cattgttgaa     180
 36 gatggcaaaa ccaactttgt gctacacaaa ttagattcag tggatgaggc aaactttgga     240
 38 tataactaca gcttagtggg aggaacaggg ttggatgaaa gtttagagaa agttgaattt     300
 40 gagacaaaaa ttgttgctgg ctctgatggt ggatccattg ttaagatttc agtgaaatac     360
 42 cataccaaag gtgatgcaac tctatctgaa gcagtacgtg aggagactaa ggccaaagga     420
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 52 <220> FEATURE:
 53 <223> OTHER INFORMATION: Nucleotide sequence of H11 coding region
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 60 ctaaagtttt cattagatca tcaaattaat atcaaacaaa cttctcttct atccctcaca     180
 62 gcaatcacat ttccattctt attggatacc aaagagtttg ggatatttga aggaagaaca     240
 64 tttgctctca ttcacccccat tgtgttgggt ggtttgttct tctatactct atatgctggc    300
 66 tatttggggt ggcaatggcg ccgagttagg actattcaaa atgatattaa tgagctcaag     360
 68 aaacaactca aacctgcacc ggtcgcccct gatggtaaag cacttgaaac ttcaccgcca     420
 70 tcacctgttg aacttcaaat ccagaaactt actgaggaga ggaaagagct tatcaaaggt     480
 72 tcatacaggg ataaacactt taatgctgga tccatacttc taggatttgg tgtctttgag    540
 74 gctgttggtg tgaggactca acacatggtt aaggacagga aagctatttc caggtccaca    600
 76 tttatttgca ggagcaggca ttaccgtctt atgggcactg gcagcagctc tagtaccacc    660
 78 gatgcagaaa ggcagtga                                                   678
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RAW SEQUENCE LISTING                    DATE: 01/12/2005
PATENT APPLICATION:  US/10/519,811      TIME: 09:45:17

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Output Set: N:\CRF4\01122005\J519811.raw

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83 <212> TYPE: DNA
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86 <220> FEATURE:
87 <223> OTHER INFORMATION: Nucleotide sequence of H12 coding region
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92 aagagtcttt tacaaagtga tgctctttac cagtatattc tagagaccag tgtcttccca     120
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96 atgacaacct ctgcagatga aggacaattt ttgagcatgc tccttaaact tatcaatgct     240
98 aagaatacca tggaaattgg tgtctacact ggctactccc tccttgccac tgccctagct     300
100 attcctgaag atggaaagat tttggctatg gacattaaca aagaaaatta cgaattgggt     360
102 ctacctgtaa ttaaaaaagc tggtgttgat cacaaaattg atttcagaga aggtccagct     420
104 cttccagttc ttgatgaaat gatcaaagac gaaaagaatc atggtagcta cgatttcatt     480
106 tttgtggatg ctgacaaaga caattacctc aactaccata agaggttaat tgatcttgtt     540
108 aaagtgggag gtgtgatcgg gtacgacaac accttatgga atggatctgt ggttgcaccc     600
110 cctgatgctc cattgaggaa gtatgttagg tactatagag attttgtttt ggagcttaac     660
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118 <211> LENGTH: 634
119 <212> TYPE: DNA
120 <213> ORGANISM: Medicago sativa
122 <220> FEATURE:
123 <223> OTHER INFORMATION: Nucleotide sequence of H7 regulatory region
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130 gtaacttta gaagaaggtt ttttttttaa ggattttaga ggaaggttag caacacacat      180
132 gcactttaaa tatacatttt ttcttataaa gtttttgtat cgagttgaga aatcatatat     240
134 atactcataa atcatgtgga tttcatataa tttaatagaa cacataaatt ttaaccgaga     300
136 aataaagtgt tgcaaatata tgttaaaaga gtacgttgtt aacattattt taatttcttt     360
138 tattcaatcc acactttgag tcatggactg ctatactaat tcattttgtt tttcgcaacc     420
140 taattagaga ttgtccagat acaaagagga gtaacctaat aaataaatat taaaatattc     480
142 accaacggcc tcagtaagct acttgagcta aacaatgaga tttccaaata aggtaggtcc     540
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150 <211> LENGTH: 438
151 <212> TYPE: DNA
152 <213> ORGANISM: Medicago sativa
154 <220> FEATURE:
155 <223> OTHER INFORMATION: Nucleotide sequence of H11 regulatory region
157 <220> FEATURE:
158 <221> NAME/KEY: misc_feature
159 <222> LOCATION: (1)..(438)
160 <223> OTHER INFORMATION: where "n" is a or g or c or t or other
163 <400> SEQUENCE: 5
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RAW SEQUENCE LISTING                    DATE: 01/12/2005
PATENT APPLICATION:  US/10/519,811      TIME: 09:45:17

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Output Set: N:\CRF4\01122005\J519811.raw

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     168 ggatgaatga tttattattg agtttatgaa tttgaactat tacttctaat ttctaaatga   180
     170 agacatttaa gtaaaagatt aaaatattct agtttcaaat attttggatt ttagaattta   240
     172 aatttaatct ttaaaaaaaa attaaattta aagaagataa aaagggagaa aataaataga   300
     174 tgaatataat ttgtaaacat gaagacctta tctccagtaa aaaaacatat ggaccttatc   360
     176 tttttgaggt aggaaggatc tacgcgggga acctcttcct gactgtgaac cccgtatgca   420
     178 gaggcagaga cagagagt                                                 438
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     183 <212> TYPE: DNA
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     194 aatttattat taaaattcac acttagatgg cctaaaaatt aacacttatt tttaacaatt   180
     196 caaataaaat atacgacgaa atgagtgtaa tttagttggt taagcatcgt caaagcttgg   240
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     200 acctccaaca aaatttattt gatagtcgat tcaaattatc aaaatttgga aaatattttg   360
     202 taaattgtta agttgggaaa aatatgttaa ttttcaaatt accatttgca cattttttcta   420
     204 atctcaaatc acatttaagg gatgttgact actttcgttt tgtacaaatc tttacaatttt   480
     206 taacatttat aaaatgtgtt ttggtagata aaaagtgtga gtattcttta taagagattg   540
     208 tgttttttctt ttgttttaac ttataaaata aatatatatt ttatttttatt ttaacgtgag   600
     210 attgtaagaa ttcattataa gattatgtca ttccctcaaa agaaaattag atgatgtcat   660
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     216 gaaagtagac ctcaccaacc acgaaccgga cgccgaccgg ttcaaccaaa catcacacca   840
     218 attttcctaa accataccgg ttttttccctc ccttatataa ccatcctctc ccctcttctc   900
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     225 <212> TYPE: DNA
     226 <213> ORGANISM: Medicago sativa
     228 <220> FEATURE:
     229 <223> OTHER INFORMATION: Nucleotide sequence of genomic H7
     231 <400> SEQUENCE: 7
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     238 gcactttaaa tatacatttt ttcttataaa gtttttgtat cgagttgaga aatcatatat   240
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266 tttcagtgaa ataccatacc aaaggtgatg caactctatc tgaagcagta cgtgaggaga  1080
268 ctaaggccaa aggaactgga cttatcaagg ccattgaggg ctacgtttta gcaaacccta  1140
270 attactagcc aattaaaccc tattgaggac tttaatttgg gttgtgttgt ttcatgcgaa  1200
272 taataattaa agtttatgat gcggttgaag tgtgttgagt atacatcaag gtctttggct  1260
274 cgtacatgtg tgttggcttt gttggatgtt gtgaggtttg agtgctattt tgggtgttta  1320
276 aaaacaaaaa cctatgttgt gttggtgata aggttttgca ccatctgtat tatgcaataa  1380
278 ataatgcaaa agaattttat cgcgaaaaaa aaaaaaaaaa aaaa              1424
281 <210> SEQ ID NO: 8
282 <211> LENGTH: 1482
283 <212> TYPE: DNA
284 <213> ORGANISM: Medicago sativa
286 <220> FEATURE:
287 <223> OTHER INFORMATION: Nucleotide sequence of genomic H11
289 <220> FEATURE:
290 <221> NAME/KEY: misc_feature
291 <222> LOCATION: (1)..(1482)
292 <223> OTHER INFORMATION: Where n is a or g or c or t or other
295 <400> SEQUENCE: 8
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300 ggatgaatga tttattattg agtttatgaa tttgaactat tacttctaat ttctaaatga   180
302 agacatttaa gtaaaagatt aaaatattct agtttcaaat attttggatt ttagaattta   240
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316 tctcttctat ccctcacagc aatcacattt ccattcttat tggataccaa ggcaagcaag   660
318 caagcaagca tcctattcta ttctattctt tcatccatat ctttactctt ttgttttcta   720
320 accaatccat gatatgaatg ttgttgaaac aggatgcact tgctgttggt ggagagtttg   780
322 ggatatttga aggaagaaca tttgctctca ttcaccccat tgtgttgggt ggtttgttct   840
324 tctatactct atatgctggc tatttggggt ggcaatggcg ccgagttagg actattcaaa   900
326 atgatattaa tgagctcaag aaacaactca aacctgcacc ggtcgcccct gatggtaaag   960
328 cacttgaaac ttcaccgcca tcacctgttg aacttcaaat ccagaaactt actgaggaga  1020
330 ggaaagagct tatcaaaggt tcatacaggg ataaacactt taatgctgga tccatacttc  1080
332 taggatttgg tgtctttgag gctgttggtg tgaggactca acacatggtt aaggacagga  1140
334 aagctatttc caggtccaca tttatttgca ggagcaggca ttaccgtctt atgggcactg  1200
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338 gctctgaata cattgaatgt tcttctcttt gtgtggcaga ttcccactgg acttgatatt  1320
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344 ctattctgca ttttcaaaaa aaaaaaaaaa aaaaaaaaaa aa                1482
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RAW SEQUENCE LISTING         DATE: 01/12/2005
PATENT APPLICATION:  US/10/519,811    TIME: 09:45:17

Input Set : **A:\892370 - seq.txt**
Output Set: **N:\CRF4\01122005\J519811.raw**

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352 <220> FEATURE:
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360 aatttattat taaaattcac acttagatgg cctaaaaatt aacacttatt tttaacaatt   180
362 caaataaaat atacgacgaa atgagtgtaa tttagttggt taagcatcgt caaagcttgg   240
364 agagaaagat catagtttga tctttgaaaa ctatactatt gaaaagggtg aagatatcta   300
366 acctccaaca aaatttattt gatagtcgat tcaaattatc aaaatttgga aaatattttg   360
368 taaattgtta agttgggaaa aatatgttaa ttttcaaatt accatttgca cattttctta   420
370 atctcaaatc acatttaagg gatgttgact actttcgttt tgtacaaatc tttacaattt   480
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376 attgtaagaa ttcattataa gattatgtca ttccctcaaa agaaaattag atgatgtcat   660
378 tttcataact catttttctat aaatacagaa aatcctcaaa aatgaaaaac ctcggtcaaa  720
380 aaataaaaga aaaacatcaa tagtggactg gcccacactc attgctttgc tttagtatga   780
382 gaaagtagac ctcaccaacc acgaaccgga cgccgaccgg ttcaaccaaa catcacacca   840
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386 taaccaagct tcattcaact cttcaacaca tatcagaaac agaaaaaaga agcaaaacat   960
388 tccaagaatt taacaatggc aaccaacgaa gatcaaaagc aaactgaatc tggaagacat  1020
390 caagaagttg gtcacaagag tcttttacaa agtgatgctc tttaccagta tattctagag 1080
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406 ttaattgatc ttgttaaagt gggaggtgtg atcgggtacg acaacacctt atggaatgga 1560
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416 aaagtcttca agccttcttg tcttttgtta ttttttcttca acatatttgt ggttgtaatt 1860
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421 <210> SEQ ID NO: 10
422 <211> LENGTH: 157
423 <212> TYPE: PRT
424 <213> ORGANISM: Medicago sativa
426 <220> FEATURE:
427 <223> OTHER INFORMATION: Amino acid sequence encoded by H7 coding region
429 <400> SEQUENCE: 10
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432 1               5                   10                  15
435 Ala Lys Leu Tyr Lys Ala Leu Ala Lys Asp Ala Asp Glu Ile Val Pro
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**RAW SEQUENCE LISTING ERROR SUMMARY**  DATE: 01/12/2005
PATENT APPLICATION:  US/10/519,811  TIME: 09:45:18

Input Set : A:\892370 - seq.txt
Output Set: N:\CRF4\01122005\J519811.raw

Please Note:
Use of n and/or Xaa have been detected in the Sequence Listing. Please review the Sequence Listing to ensure that a corresponding explanation is presented in the <220> to <223> fields of each sequence which presents at least one n or Xaa.

Seq#:5; N Pos. 12
Seq#:8; N Pos. 12
Seq#:12; N Pos. 43,44

VERIFICATION SUMMARY                    DATE: 01/12/2005
PATENT APPLICATION:  US/10/519,811      TIME: 09:45:18

Input Set : A:\892370 - seq.txt
Output Set: N:\CRF4\01122005\J519811.raw

L:11 M:270 C: Current Application Number differs, Replaced Current Application Number
L:12 M:271 C: Current Filing Date differs, Replaced Current Filing Date
L:164 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:5 after pos.:0
L:296 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:8 after pos.:0
L:560 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:12 after pos.:0